



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/086,897	03/04/2002	Tomoyuki Yoshida	220287US2	1909

22850 7590 11/29/2006

C. IRVIN MCCLELLAND  
OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C.  
1940 DUKE STREET  
ALEXANDRIA, VA 22314

EXAMINER

BAKER, CHARLOTTE M

ART UNIT

PAPER NUMBER

2625

DATE MAILED: 11/29/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No. 10/086,897	Applicant(s) YOSHIDA, TOMOYUKI	
	Examiner Charlotte M. Baker	Art Unit 2625	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 03/04/2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |  |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                               | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                      | 5) <input type="checkbox"/> Notice of Informal Patent Application                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date ____ | 6) <input type="checkbox"/> Other: ____  |

**DETAILED ACTION*****Response to Arguments***

1. Applicant's arguments filed 09/19/2006 have been fully considered but they are not persuasive. Regarding Applicant's argument that Fotland does not disclose comparing the reference color patch after a predetermined plurality of images have been processed, Examiner respectfully traverses. Attention is drawn to Fotland (par. 24) where "the printed image is periodically updated to provide near real time comparison between the reference image and the printed image". In addition, attention is drawn to par. 26 where Fotland discloses, "If variable images are being printed, then a test pattern must be run to provide a reference file and periodic **test patterns** also run to provide a sample real-time image". The Fotland disclosure satisfies Applicant's "predetermined plurality of images have been processed". Applicant points out on p. 10 of the remarks that the purpose of comparing these reference color patches over time is to make a determination as to whether color drifts have occurred. Fotland is also concerned with determination of whether color drifts have occurred as evidenced in pars. 24 and 27. Regarding the reference color patches, Fotland discloses in par. 29 "test color strips" that may be used "to assist the operator in maintaining color fidelity". By employing the test patterns discussed by Fotland (par. 29), Fotland satisfies the elements argued by Applicant. See rejections below.

***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an

Art Unit: 2625

international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

3. Claims 1-5 and 8-20 are rejected under 35 U.S.C. 102(e) as being anticipated by Fotland (US 2001/0048529).

**Regarding claim 1:** Fotland discloses a storage unit which stores reference image data (stored reference image, par. 25) generated based on image data for reference color patches (par. 29) to provide stored image data of the reference color patches (par. 29); a display unit (Fig. 2, display screen 28) which reproduces two images (par. 25), a first image (first digital file, par. 12) based on processed image data of the reference color patches (par. 29) after a predetermined plurality of images have been processed since generation of the reference image data (pars. 24 and 26) and a second image (second digital file, par. 12) based on the reference image data stored in the storage unit (stored reference image, par. 25) containing the stored image data of the reference color patches (par. 29), and displays the two images so as to be contrasted with each other (par. 12); and an instruction unit (digital image control means, par. 12) which issues an instruction (color-blinking region) to execute calibration of conversion characteristics in the processing for color conversion based on the two images displayed on the display unit (Fig. 2, display screen 28) (par. 12).

**Regarding claim 2:** Fotland satisfies all the elements of claim 1. Fotland further discloses averaging unit (two images overlapped, par. 12) which averages the read image data for the reference color patches (par. 29), on a time varying basis (pars. 24 and 26), wherein the image data averaged by the averaging unit (two images overlapped, par. 12) is used as the read image data for the reference color patches (par. 29) that is displayed on the display unit (Fig. 2, display screen 28) as one of the images to be contrasted (par. 12).

**Regarding claim 3:** Fotland satisfies all the elements of claim 2. Fotland further discloses a storage unit (par. 12) which stores the image data averaged by the averaging unit (two images overlapped, par. 12), wherein the averaging unit (two images overlapped, par. 12) averages a currently read image data and the image data fetched from the storage unit (par. 12).

**Regarding claim 4:** Fotland satisfies all the elements of claim 1. Fotland further discloses wherein the color conversion is processing for converting an RGB space (color image is scanned, par. 10) that is specific to the color image sensor (scanner), to a standard color space (YMCK, pars. 10 and 12), and the reference image data stored in the storage unit is data for the standard color space (YMCK, pars. 10 and 12).

**Regarding claim 5:** Fotland satisfies all the elements of claim 1. Fotland further discloses wherein the reference image data is data based on colorimetric values of the reference color patches (test patterns; YMCK, pars. 10 and par. 29).

**Regarding claim 8:** Arguments analogous to those stated in the rejection of claim 1 are applicable. In addition, Fotland discloses reading the reference color patches by the color image sensor to obtain image data for the reference color patches (cols. 10, 12 and 29).

Also, Fotland discloses scanner 2, which is a color scanner (par. 14). The remaining limitations in the claim (light source, color image sensor and color converter) are all inherent to a color scanner (Fig. 1, scanner 2 and par. 14, original image 1 is digitally color scanned).

**Regarding claim 9:** The structural elements of claim 8 perform all of the steps of method claim 9. Thus, claim 9 is rejected for the same reasons discussed in the rejection of claim 8.

**Regarding claim 10:** Fotland satisfies all the elements of claim 9. The structural elements of claim 2 perform all of the steps of method claim 10. Thus, claim 10 is rejected for the same reasons discussed in the rejection of claim 2.

**Regarding claim 11:** Fotland satisfies all the elements of claim 10. The structural elements of claim 3 perform all of the steps of method claim 11. Thus, claim 11 is rejected for the same reasons discussed in the rejection of claim 3.

**Regarding claim 12:** Fotland satisfies all the elements of claim 9. The structural elements of claim 4 perform all of the steps of method claim 12. Thus, claim 12 is rejected for the same reasons discussed in the rejection of claim 4.

**Regarding claim 13:** Fotland satisfies all the elements of claim 9. The structural elements of claim 5 perform all of the steps of method claim 13. Thus, claim 13 is rejected for the same reasons discussed in the rejection of claim 5.

**Regarding claim 14:** Fotland satisfies all the elements of claim 13. The structural elements of claim 6 perform all of the steps of method claim 14. Thus, claim 14 is rejected for the same reasons discussed in the rejection of claim 6.

**Regarding claim 15:** Fotland satisfies all the elements of claim 9. The structural elements of claim 7 perform all of the steps of method claim 15. Thus, claim 15 is rejected for the same reasons discussed in the rejection of claim 7.

Art Unit: 2625

**Regarding claim 16:** Arguments analogous to those stated in the rejection of claim 8 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

**Regarding claim 17:** Fotland satisfies all the elements of claim 16. Arguments analogous to those stated in the rejection of claim 2 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

**Regarding claim 18:** Fotland satisfies all the elements of claim 17. Arguments analogous to those stated in the rejection of claim 3 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

**Regarding claim 19:** Fotland satisfies all the elements of claim 16. Arguments analogous to those stated in the rejection of claim 4 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

**Regarding claim 20:** Fotland satisfies all the elements of claim 16. Arguments analogous to those stated in the rejection of claim 5 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 6 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fotland in view of Whiting (6,618,170).

**Regarding claim 6:** Fotland satisfies all the elements of claim 5. Fotland further discloses wherein reference image data (color separation files); colorimetric values of the reference patches (YMCK, pars. 10 and 29).

Fotland fails to specifically address adding a predetermined variation.

Whiting et al. disclose adding a predetermined variation (controlling color hue in a printer output, Figs. 3A-3E and col. 4, ln. 11-45).

**Regarding claim 21:** Fotland satisfies all the elements of claim 20. Arguments analogous to those stated in the rejection of claim 6 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

6. Claims 7 and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fotland in view of Chiang et al. (5,535,021).

**Regarding claim 7:** Fotland satisfies all the elements of claim 1. Fotland further discloses wherein the reference image data patches (par. 29); performing color conversion on the image data (RGB to CMYK, par. 10).

Fotland fails to specifically address reading a reference patch at the time of manufacture.

Chiang et al. disclose is based on data obtained by reading the reference color patches in an initial state at the time of manufacture of the image reading apparatus by the color image sensor to obtain image data (col. 7, ln. 53-67).

It would have been obvious to a person of ordinary skill in the art at the time of the invention to include reading a reference patch at the time of manufacture in order to obtain the desired illuminance from the scanned object as taught by Chiang et al. (col. 7, ln. 57-59).



Art Unit: 2625

**Regarding claim 22:** Fotland satisfies all the elements of claim 20. Arguments analogous to those stated in the rejection of claim 7 are applicable. A computer program is inherently taught as evidenced by (computer, par. 11) and various memories stored therein.

*Conclusion*

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Kim (6,624,912; Cookingham et al. (6,658,139).

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Charlotte M. Baker whose telephone number is 571-272-7459. The examiner can normally be reached on Monday-Friday 8:30-5:00.

Art Unit: 2625

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kimberly A. Williams can be reached on 571-272-7471. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
CMB



**KIMBERLY WILLIAMS**  
**SUPERVISORY PATENT EXAMINER**